

Patent Application No. 09/821,168

IN THE CLAIMS:

Please amend claims 1, 4, 10, 12 and 14, and add new claims 16-18 as follows:

1 Claim 1. (currently amended) A method of operating a mobile agent
2 that travels through a network of a number of computers, wherein the
3 mobile agent is executed in a sequence of stages and wherein each stage
4 comprises a set of places, the method comprising the following steps:
5 executing the mobile agent in at least one of the set of places of a
6 respective one of the stages,
7 evaluating in which place of the respective stage the mobile agent
8 has been executed successfully,
9 agreeing on ~~this~~ a primary place among the set of places,
10 aborting and/or undoing any operation in connection with the mobile
11 agent in any other place of the respective stage, and
12 moving a modified mobile agent resulting from the successful
13 execution to the next stage from at least two forwarding places.

1 Claim 2. (original) The method of claim 1 wherein the steps are
2 repeated for any one of the sequence of stages.

1 Claim 3. (original) The method of claim 1 wherein the mobile
2 agent is executed sequentially in the set of places of the respective
3 stage, and wherein the mobile agent is not executed anymore in subsequent
4 places after successful execution in one of the set of places and
5 agreement on this successful execution.

1 Claim 4. (currently amended) The method of claim 1 wherein a
2 decision is generated in each stage including at least one of ~~a~~ the
3 primary place that corresponds to the place in which the mobile agent has
4 executed successfully, the set of places of the next stage to which the
5 modified mobile agent is moved, ~~and/or~~ and the resulting modified mobile
6 agent.

1 Claim 5. (original) The method of claim 4 wherein at least one
2 of the primary place and/or the set of places of the next stage and/or the
3 resulting modified mobile agent is confirmed to at least all other places
4 of the respective stage except the primary place.

Patent Application No. 09/821,168

1 Claim 6. (original) The method of claim 4 wherein at least one
2 of the primary place and/or the set of places of the next stage and/or the
3 resulting modified mobile agent is moved to all places of the next stage.

1 Claim 7. (original) The method of claim 6 wherein the move is
2 performed as a reliable forward function.

1 Claim 8. (original) The method of claim 1 wherein the steps are
2 managed by a fault-tolerance enabler (FTE) which is independent of the
3 mobile agent.

1 Claim 9. (original) The method of claim 8 wherein the FTE
2 travels with the mobile agent to the set of places of the respective
3 stage.

1 Claim 10. (currently amended) A computer program product comprising
2 program code means for use for operating a mobile agent that travels
3 through a network of a number of computers, wherein the mobile agent is
4 executed in a sequence of stages and wherein each stage comprises a set of
5 places, the computer program product comprising instructions for:
6 executing the mobile agent in at least one of the set of places of a
7 respective one of the stages,
8 evaluating in which place of the respective stage the mobile agent
9 has been executed successfully,
10 agreeing on ~~this~~ a primary place among the set of places,
11 aborting and/or undoing any operation in connection with the mobile
12 agent in any other place of the respective stage, and
13 moving a modified mobile agent resulting from the successful
14 execution to the next stage from at least two forwarding places.

1 Claim 11. (original) Computer program product according to claim
2 10, wherein the program code means is stored on a computer-readable
3 medium.

1 Claim 12. (currently amended) A network of a number of computers in
2 which a mobile agent is traveling through, wherein the network comprises a
3 sequence of stages, wherein each stage comprises a set of places, and
4 wherein the mobile agent is executed in at least one of the set of places
5 of a respective one of the stages, the network comprising means for
6 evaluating in which place of the respective stage the mobile agent has

Patent Application No. 09/821,168

7 been executed successfully, means for agreeing on ~~this~~ a primary place
8 among the set of places, means for aborting and/or undoing any operation
9 in connection with the mobile agent in any other place of the respective
10 stage, and means for moving a modified mobile agent resulting from the
11 successful execution to the next stage from at least two forwarding
12 places.

1 Claim 13. (previously presented) The method of claim 1, wherein
2 the mobile agent is a computer program that acts autonomously on behalf of
3 an agent owner or user and that travels through a network of a number of
4 computers.

1 Claim 14. (currently amended) The computer program product of claim
2 ~~11~~ 10, wherein the mobile agent is a computer program that acts
3 autonomously on behalf of an agent owner or user and that travels through
4 a network of a number of computers.

1 Claim 15. (previously presented) The network of claim 12, wherein
2 the mobile agent is a computer program that acts autonomously on behalf of
3 an agent owner or user and that travels through a network of a number of
4 computers.

1 Claim 16. (new) The method of claim 1, wherein non-primary places
2 are configured to verify the modified mobile agent has successfully
3 arrived at the set of places of the next stage to which the modified
4 mobile agent is moved.

1 Claim 17. (new) The computer program product of claim 10, wherein
2 non-primary places are configured to verify the modified mobile agent has
3 successfully arrived at the set of places of the next stage to which the
4 modified mobile agent is moved.

1 Claim 18. (new) The network of claim 12, wherein non-primary
2 places are configured to verify the modified mobile agent has successfully
3 arrived at the set of places of the next stage to which the modified
4 mobile agent is moved.